

Amdt. dated January 30, 2004Reply to Office Action of July 30, 2003**REMARKS**

Claims 14-21, 23-27 and 50-60 are pending and claims 14-21 and 23-27 have been allowed. By this amendment claims 50-60 are added and the remaining claims have been canceled.

Reconsideration of the application is respectfully requested for the following reasons.

In the Office Action, the Examiner rejected claims 1, 32, 33, and 37 under 35 U.S.C. §102(e) for being anticipated by the Manning patent, rejected claims 2, 3, 35, and 36 under 35 U.S.C. §103(a) for being obvious in view of a combination formed between the Manning and Cheng patents, and rejected claims 5-12, 28, 30, 31, and 38-49 under 35 U.S.C. §103(a) for being obvious in view of a combination formed the Manning and Cerwall patents taken alone or in combination with one or more of the Cheng and Korpela patents. All of the rejected claims have been canceled, without prejudice or disclaimer, for the sole purpose of expediting the prosecution and Applicant reserves the right to pursue these claims at a later time.

It is respectfully submitted that new claims 50-60 are allowable. Claims 50-52 are method claims for obtaining a condition of a channel or a cell, and none of the cited references disclose or teach such features and the combination thereof. Method claims 53-55 relate to a ciphering operation, and none of the applied references disclose or teach the features or combinations thereof.

Further, new claims 56-60 are believed to be allowable over the applied art. None of the references disclose a medium access control sub-layer having a plurality of separate entities where each entity performs at least one corresponding different functions and the plurality of separate entities being a broadcast entity, a common entity and a dedicated entity. In the Office Action, the Patent Office applied Manning et al. (U.S. Patent No. 6,519,266) and Cerwall (U.S. Patent No. 6,275,701). It is respectfully submitted that neither reference teaches the features and the combinations thereof as recited in independent claim 50.

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Manning et al. discloses in Figures 2-7 state machine diagrams. Such state machine diagrams are not the same as the entities recited in independent claim 50. It is known to one of ordinary skill in the art that state machine diagrams are different from the entities of a communication device and/or system. For Examiner's reference, attached herewith are excerpts from TS 101.504 for Tandem Free Operation, which illustrates functional entities in Figure 1 and state machine in Figure 11. As shown therein, the entities are different from a state machine. The only disclosed function of the layers is illustrated in Figure 3, and there is no corresponding disclosure regarding a medium access control sub-layer having a plurality of separate entities, where each entity performs at least one corresponding different functions, and the plurality of entities comprise a broadcast entity, a common entity and a dedicated entity and the combination thereof, as recited in claim 56. Further, Cerwall fails to teach such features found lacking in Manning et al. Hence, it is respectfully submitted that new claims 56-60 are also allowable.

### CONCLUSION

Because the remaining claims have been allowed, it is respectfully submitted that the application is in condition for allowance. Favorable consideration and prompt allowance of the application is respectfully requested.

In view of the foregoing amendments and remarks, it is respectfully submitted that the application is in condition for allowance. If the Examiner believes that any additional changes would place the application in better condition for allowance, the Examiner is invited to contact the undersigned attorney, Daniel Y.J. Kim, at the telephone number listed below.

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In view of the foregoing amendments and remarks, it is respectfully submitted that this application is in condition for allowance. Favorable consideration and prompt allowance are earnestly solicited.

To the extent necessary, Applicants petition for an extension of time under 37 CFR §1.136. Please charge any shortage in fees due in connection with this application, including extension of time fees, to Deposit Account No.16-0607 and credit any excess fees to the same Deposit Account.

Respectfully submitted,  
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Attachment: TS 101.504

**Please direct all correspondence to Customer Number 34610**

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# ETSI TS 101 504 V8.0.1 (2000-08)

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*Technical Specification*

**Digital cellular telecommunications system (Phase 2+);  
Inband Tandem Free Operation (TFO) of Speech Codecs;  
Service Description;  
Stage 3  
(GSM 08.62 version 8.0.0 Release 1999)**

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parallel to these TFO Frames also other *TFO Messages* are transferred on the A-interface. TFO Messages according to the IS Message Principles described in Annexes A and B.

The TFO protocol between the TRAUs is independent of the position of the TRAUs within the GSM networks.

A possible configuration of two TRAUs is shown in Figure 1, which is intended as a reference model.

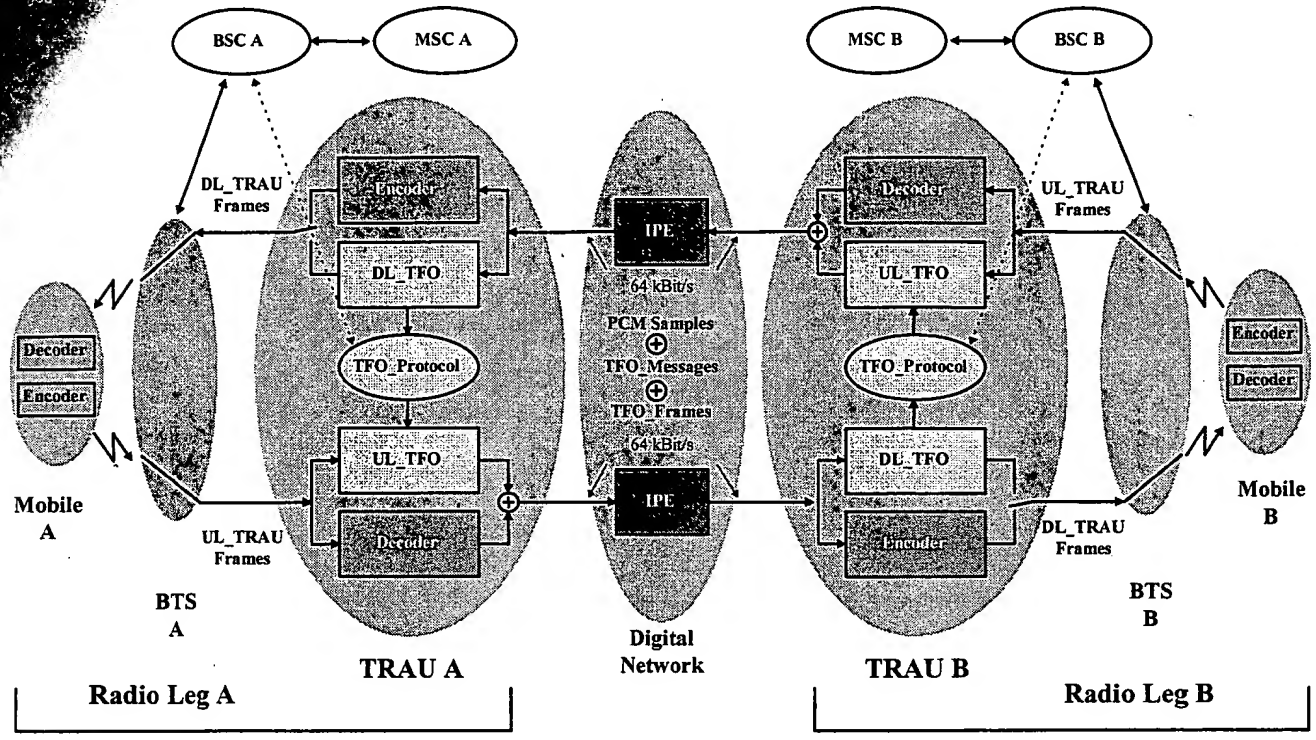


Figure 1: Functional Entities for Handling of Tandem Free Operation in MS-MS calls

TFO shall provide a virtually transparent digital channel from Encoder of Mobile A to Decoder of Mobile B and vice versa.

- (• Operation).
- Local Handover (• Fast\_Try, • Fast\_Contact).
- Distant Handover (• Sync\_Lost, • Re\_Konnect).
- Misbehaviour (• Failure).

It is assumed that Events (Conditions checking, Actions and Transition to an other State) are handled almost instantaneous and in any case significantly shorter than the time required to complete the transmission of any one TFO Message or TFO Frame.

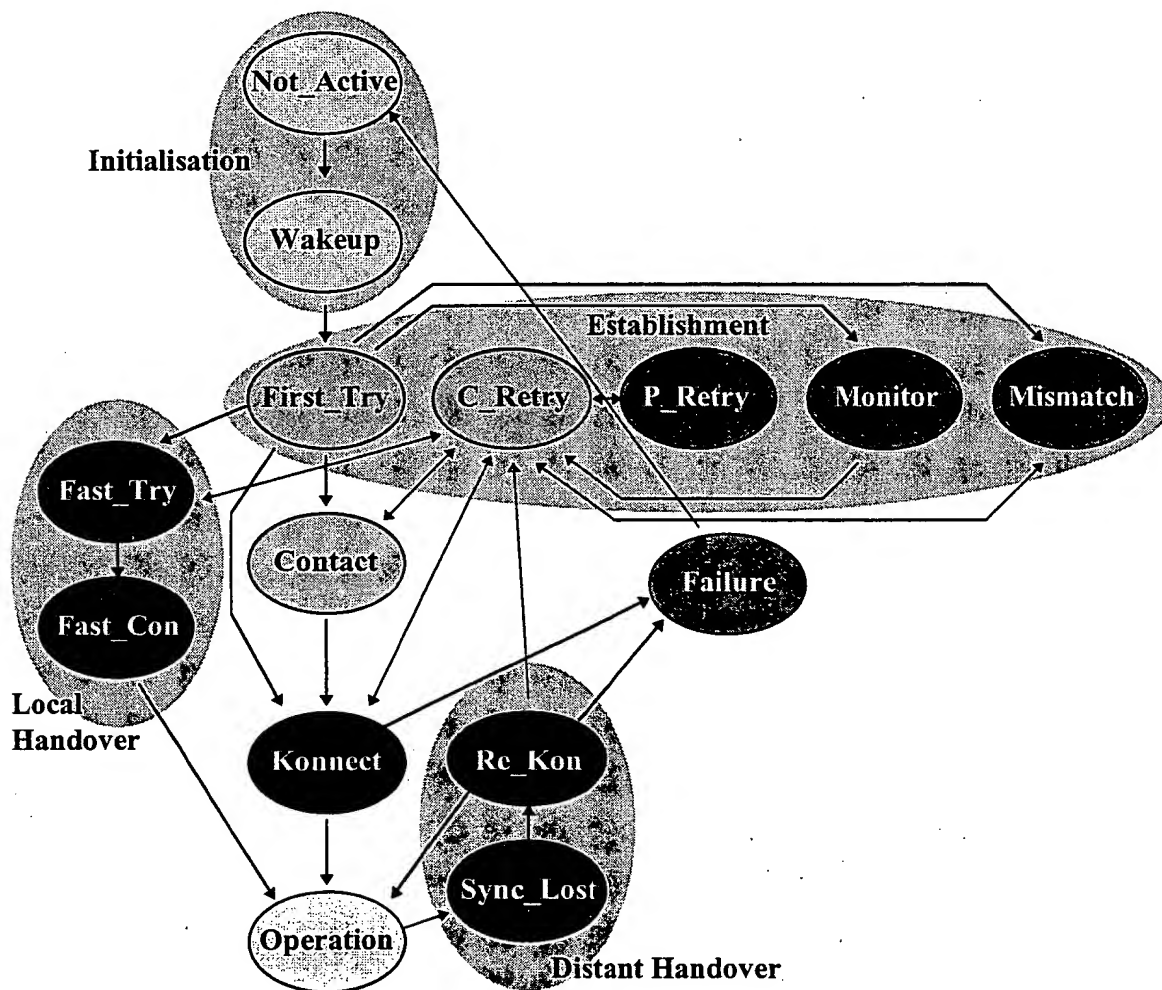


Figure 11: TFO\_Protocol State Machine with most important transitions

## 9.1 Initialisation

### 9.1.1 Not\_Active State

The TRAU in Not\_Active receives and sends the PCM\_Idle patterns from and onto the A interface. Similarly, it receives and sends Abis\_Idle patterns from and onto the Abis/Ater interface. This is not described further.

The TRAU may also be in Data mode, which is also not described further, but is handled here as "Not\_Active".

If PCM\_Non\_Idle patterns are received prior to TRAU Speech Frames, then these PCM\_Non\_Idle patterns shall be ignored - even if they contain possibly TFO Messages.